

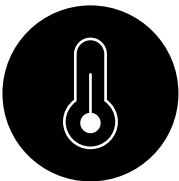


# FARRAR ULTRA-LOW TEMPERATURE FREEZER

FARRAR -50°C to -86°C lab grade ultra-low temperature freezers are designed and configured for precision temperature storage within biopharmaceutical and life science research applications. Designed with ENERGY STAR® certification in mind and SNAP/EU-F-gas compliant, the FARRAR ULT helps minimize environmental impact by pairing a variable capacity compressor with low global warming potential (GWP) natural hydrocarbon refrigerants.

In addition to supporting sustainability goals, this ULT Freezer delivers superior temperature performance across three key areas – chamber uniformity, reliability, and temperature recovery.

Affordably priced, FARRAR's ULT operates quietly to help ensure productive workspaces and has undergone Accelerated Life Testing (ALT) to deliver a long service life in a busy lab environment.



## Temperature Uniformity and Performance

FARRAR's -50°C to -86°C ULT offers wide range temperature management to meet drug product, drug substance and other biologic temperature requirements. FARRAR's FUF126 is optimized to help ensure:

- **Uniformity** – Consistent temperature throughout the chamber (+/-5°C)
- **Recovery** – Rapid return to temperature set point after door opening



## Product Quality and Reliability

The FUF126 is engineered to last. FARRAR ultra-low temperature freezer solutions must pass stringent Accelerated Life Testing (ALT) to ensure long-term reliability. ALT Testing includes:

- Accelerated stress factors above normal use conditions
- Elevated ambient temperatures
- Elevated humidity
- Elevated voltage



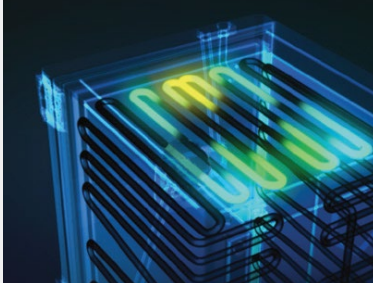
## Energy Efficiency and Sustainability

Configured for life science storage operations, the FUF126 is engineered with energy-efficient technologies to help organizations meet sustainability goals. FARRAR uses stainless steel for longevity and recyclability. To minimize impact, the FUF126 uses natural refrigerants.

- Designed to meet ENERGY STAR certification
- Utilizes low GWP hydrocarbon refrigerants (R290/R170)
- EPA SNAP, and EU F-GAS standards/requirements testing pending

# Smart Engineering that Enables Performance, Limits Access, and Helps Protect Samples

## Greater Reliability from Smart Oil Management



A primary cause of compressor failure is excess oil in the refrigeration system. FARRAR has eliminated this issue with our exclusive refrigeration design.

- Specially engineered oil separator removes virtually all oil from refrigeration lines.
- Mixed refrigerant has been optimized to ensure proper flow rate at extremely low temperatures.

## Limited Access with Smart Access Panel



The Smart Access Panel Information Center provides critical information about the freezer status. Integrated Access Control is standard on every ultra-low freezer.

- PIN controlled electronic door lock prevents unauthorized access and helps ensure sample safety.
- Intuitive interface with icon-driven touchscreen and convenient USB port helps enable easy user experience and convenient file download and firmware upload.

## Smart Sample Protection



FARRAR's design restricts access by shelf helping to protect sample integrity and allowing for frequent sample loading and retrieval.

- Shelves with protective doors enable isolated access helping to mitigate frost/ice accumulation.
- Thoughtful engineering helps protect sample viability by minimizing exposure to ambient temperature.

## FARRAR Ultra-Low Temperature Freezer

Model	Temp Range	Volume cu ft   L	Boxes 2" (51 mm) cardboard boxes	Shelves/ Compartments	Interior Dimensions wxhxd in   mm	Exterior Dimensions wxhxd in   mm	Electrical
FUF126	-50°C to -86°C	26 736	528	4 shelves 5 compartments	34.3 x 54 x 23.3 872 x 1373 x 591	40.2 x 78.2 x 35.1 1020 x 1986 x 892	115V 60 Hz 220-240V 50/60Hz

## Options & Accessories



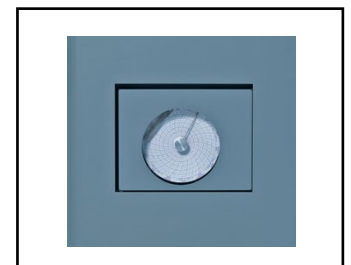
Cryo Gloves



LN2 & CO2 Backup Systems



Freezer Racks and Boxes



Inkless Chart Recorder

